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Harvard Univ
Cambridge Mass.
Gray Herbarium

PLANT SAMPLES FOR CHEMICAL ANALYSIS

(Collected during the summer of 1964)

by

Wij vdg
Salomon
Rik
3-10-67

Djaja D. Soejarto

(A report for the
U.S. Army Phytochemical Survey)

TO SUMMARY

AD D C
RECEIVED
MAY 17 1966
RECEIVED
FEB 20 1967
A
00C

INTRODUCTION

This report has been prepared from the original field-book of the author. It consists of three parts: Part I, the collection of Djaja D. Soejarto; Part II, the collection of four persons, D. D. Soejarto, H. W. Vogelmann, F. C. Olday, and E. Hernandez; Part III, the collection of D. D. Soejarto and E. Hernandez. The number indicated in front of every plant name corresponds to the number of the samples collected for chemical analysis.

Authenticity of identification.- Identification has been made by comparison of the specimen with the known herbarium, and, in some cases, through the dissections and critical examinations of literature. In case identification is not yet possible, though is still being carried out at present, the name is left blank. The name will be supplied upon request. This work, however, is intended mainly for preliminary and urgent use. The correct and final identification has to be decided by the specialist of the group concerned.

Maps of itinerary. - Maps can be supplied upon request.

How to read the data. - F.e.: 1388 Croton sp. (Euphorbiaceae) (det. D. D. Soejarto) means the collection number 1388, the plant name Croton sp., family Euphorbiaceae, identified by D. D. Soejarto. It should be noted that the number in front of each plant name refers to the number of collection of D. D. Soejarto. Following the plant names there are six or seven categories listed, these are:

1. Description of the plant.
2. Samples collected for analysis.
3. Locality.
4. Frequency of the plant in the field (region indicated).
5. Habitat.
6. Date of collecting.
7. Uses and local names, if known.

Abbreviations.- alt. = altitude

ca. = circa

Comia. = Comisaria

det. = determinavit

fl. = flowers

fr. = fruits

km. = kilometer

m. = meter

Npic. = Municipio

Prov. = Provincia

Ø = diameter

SUMMARY

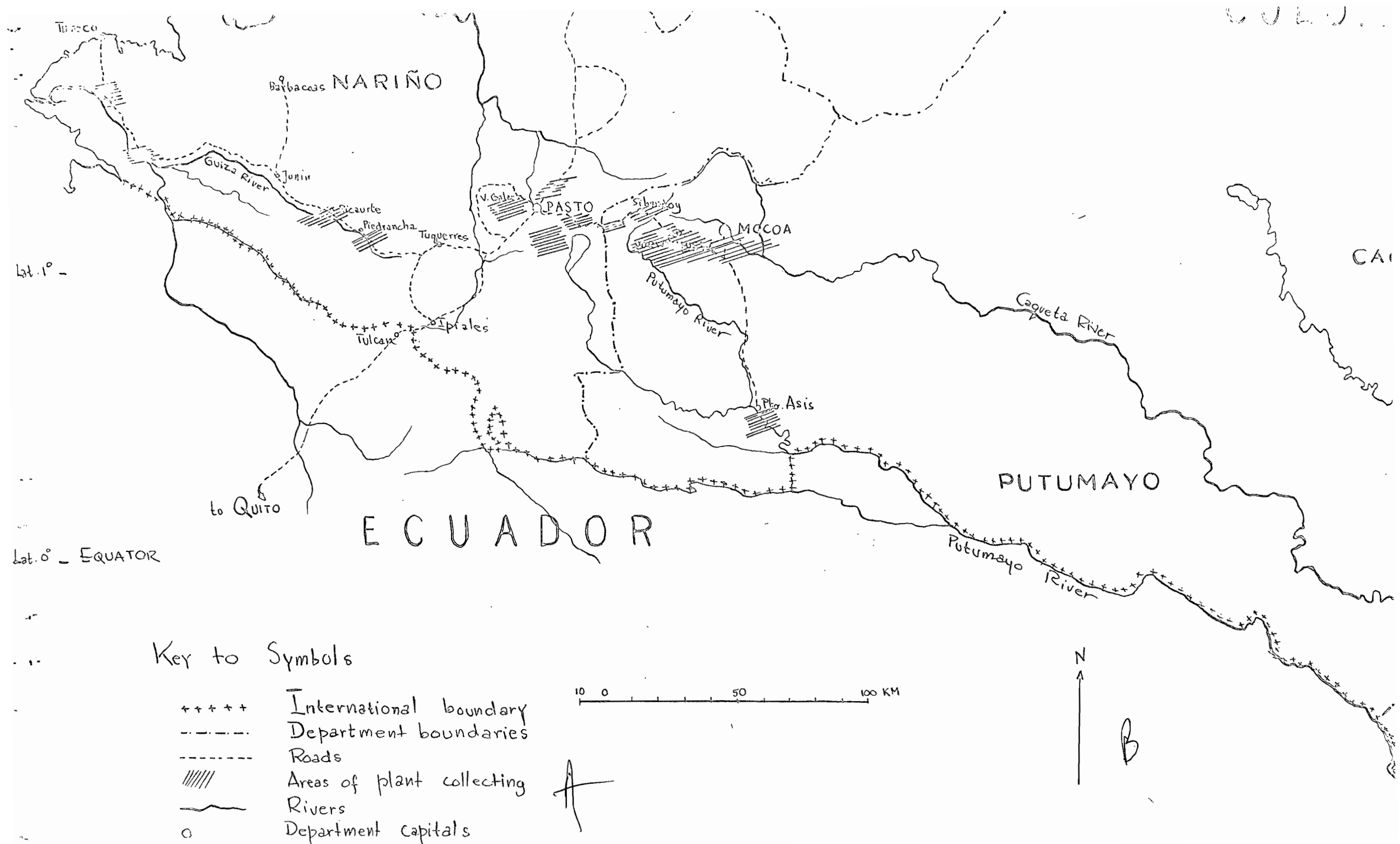
The collection listed consists of 248 numbers of samples which comprised approximately 1500 lbs. dry weight of materials. They originated from the southern part of Colombia (Part I and Part II of this report) and central Ecuador (Part III). All the samples were shipped to the U. S. directly from Pasto, Nariño, Colombia, by air mail.

Of the 248 numbers of samples collected, 27 numbers have been identified to species, 114 numbers have been identified to genus, 60 numbers have been identified to family, and 37 numbers are unidentified.

Since any information concerning uses and medicinal roles which is doubtful was not recorded, this limits to only those few plants with more certain medicinal properties. These are the following numbers: 940, 987, 1000, 1010, 1112, 1153, 1172, 1173, 1278, 1281, 1282, 1312, 1356, 1390, 1399, 1400, 1401, 1402, 1404, 1405. (DRUGS
HEREIN) See

Voucher specimens of the herbarium are located at the following Herbaria:

1. Gray Herbarium, Harvard University, Cambridge, Mass.
2. Economic Herbarium of Oakes Ames, Harvard University, Cambridge, Mass.
3. Colombia National Herbarium, Bogotá, Colombia.
4. Herbarium of Instituto Tecnológico of Universidad de Nariño, Pasto, Nariño, Colombia.



ECUADOR



- EQUATOR

- 0° 30' LAT

- 1° LAT

- 1° 30' LAT

PACIFIC OCEAN

MANABI

PICHINCHA

COTOPAXI

QUEVEDO

QUITO

4720m

Δ N. COTOPAXI
5881m

Δ 4898m

OLATACUNGA

AMBATO

TUNGURAHUA

Δ 6267m
N. CHIMBORAZO

Δ 5005m
N. TUNGURAHUA

RIOBAMBA

to BAHAMONDO

to GUAYAQUIL

CHIMBORAZO

PUYO

OCAYAMBE

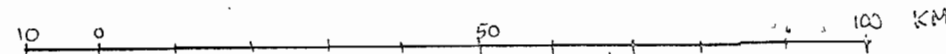
Δ 5729m

Δ 4776m

IBARRA

Key to Symbols

- Department boundaries
- - - - - Roads
- //// Collecting sites
- Δ Snow-capped mountains
- ⊙ Capital of the Republic
- Capital of Department



A

B

PART I

COLOMBIA, DPTO. de NARIÑO and Comda PUTUMAYO

Collector: D. D. SOEJARTO

- 917 Elleanthus sp. (Orchidaceae) (det. L. Garay)
1. Shrubby herb, flowers deep violet, conspicuous.
2. Stem, leaves, flowers.
3. Dpto. de Nariño, Mpio, Pasto, Bosque Botánico.
4. Frequent, in ground.
5. Humid mountain forest, 3000 m. alt.
6. July 9, 1964.
- 922 Saurauia sp. (Actinidiaceae) (det. D. D. Soejarto; possibly a hybrid)
1. Small tree, 3 m. tall. Sepals green to pale green, petals white, anthers yellow, rather fragrant.
2. Stem, bark, leaves, flowers.
3. Dpto. de Nariño, Mpio, "Iedranha, between Guabo and Ricaurte.
4. Rather frequent, scattered.
5. Growing near houses or cultivated areas, or dryish slopes, near river. Alt. ca. 1850 m.
6. July 10, 1964.
7. Fruits edible, sometimes sold in the markets. "Acquillo."
- 923 1
1. Shrub to small tree, 2-3 m. tall. Flowers deep yellow, fruits green.
2. Wood, bark, fruits, flowers, leaves.
3. Dpto. de Nariño, Mpio. de Tuqueses, below "Mariz del diablo."
4. Very common.
5. Dryish, rocky, steep slopes. Alt. ca. 2400 m.
6. July 10, 1964.
7. "Quillatocto."
- 924
1. Tree, 3-4 m. tall. Flowers pale green to white.
2. Wood, bark, leaves, flowers.
3. Dpto. de Nariño, Mpio. de Tuqueses, below "Mariz del diablo."
4. Rather rare, in groups.
5. Dry areas, but humid and shady places near river. Alt. 2400 m.
6. July 10, 1964.
- 926
1. Small herb, flowers deep red, fruits green. Bulbs white, with sticky sap.
2. Bulbs, stems, flowers, fruits.
3. Dpto. de Nariño, Mpio. Tuqueses, below "Mariz del diablo."
4. Common, in groups or scattered.
5. Dryish areas, on rocky soil and steep slopes. Alt. ca. 2000-2400 m.
6. July 10, 1964.

937a Cuphea sp. (Lythraceae) (det. D. D. Soejarto)

1. Small, semi-aquatic shrub, with a very strong rooting system, flowers pale violet.
2. All parts of the plant.
3. Dpto. de Nariño, Mpio. Ricaurte, Cartagena, Rio Guiza.
4. Not very frequent, growing in clumps.
5. Rheophyte, growing on river bottom or rocks within reach of water level during high flood. Alt. ca. 1900 m.
6. July 10, 1964.

939 ?Psychotria sp. (Rubiaceae) (det. D. D. Soejarto)

1. Shrub. Flowers pale violet, fruits dull violet to pale blue or dull blue.
2. Stem, leaves, flowers, fruits.
3. Dpto. de Nariño, Mpio. Ricaurte, Palmar.
4. Common.
5. Secondary growth. Alt. ca. 1800 m.
6. July 11, 1964.

940

1. Small herb, ca. 20-40 cm. tall.
2. All parts of the plant.
3. Dpto. de Nariño, Mpio. Ricaurte, Palmar.
4. Rare, only under cultivation.
5. Cultivated in wet and soggy places, especially in shade. Alt. ca. 1800 m.
6. July 11, 1964.
7. It is said that the leaves are crushed, and the juice is taken with sugar for a snake-bite.

941 Clusia sp. (Clusiaceae) (det. D. D. Soejarto)

1. Much-branched shrub, about 4 m. tall. Fruit creamy white, turning yellow when ripe. With yellow latex-like sap.
2. Wood, bark, fruits, leaves.
3. Dpto. de Nariño, Mpio. Ricaurte, Palmar.
4. Rather common.
5. Secondary growth, alt. ca. 1800 m.
6. July 11, 1964.

948

1. Tree, 15 m. tall, 40 cm. Bark smooth, living bark fibrous. Fruits brown. Petals yellow to pink, stamens reddish-purple. Flowers fragrant.
2. Wood, bark, leaves, fruits, flowers.
3. Dpto. de Nariño, Mpio. Tumaco, about 21 km. from Tumaco in the direction of Pasto.
4. Extremely rare.
5. Growing near cultivation area. Alt. ca. 20-50 m.
6. July 12, 1964.
7. "Zapotolongo."

949 Cassia sp. (Leguminosae) (det. D. D. Soejarto)

1. Shrub, ca. 2 m. tall, flowers yellow, fruits green.
2. Wood, bark, flowers, fruits.
3. Dpto. de Nariño, Mpio. Tumaco, ca. 24 km. from Tumaco in the direction of Pasto.
4. Common
5. Swampy area. Alt. ca. 20-50 m.
6. July 12, 1964.

- 950 Costus sp. (Zingiberaceae) (det. D. D. Soejarto)
1. Shrubby herb, 2-3 m. tall. Bracts dark red, showy. Flowers yellow, red at apex.
2. Roots, stem, flowers, fruits, leaves.
3. Dpto. de Nariño, Mpio. Tumaco, ca. 3-4 km. from Espriella in the direction of Tumaco.
4. Abundant, in clumps.
5. Swampy area. Alt. ca. 30-100 m.
6. July 12, 1964.
- 951 Isernia sp. (Rubiaceae) (det. D. D. Soejarto)
1. Treelet, 3-4 m. tall. Flowers white, conspicuous, fruits green.
2. Wood, bark, leaves, flowers, fruits.
3. Dpto. de Nariño, Mpio. Tumaco, just outside of Espriella in the direction of Pasto.
4. Abundant, especially along the road.
5. Humid places, along the road or forest edges. Alt. ca. 40-100 m.
6. July 12, 1964.
- 952
1. Shrub, 3 m. tall, profusely flowered, Petals white, fruits green, turning purplish-red when mature.
2. Wood, bark, leaves, flowers, fruits.
3. Dpto. de Nariño, Mpio. Tumaco, outside Espriella in the direction of Pasto.
4. Scattered, common.
5. Edge of swampy area. Alt. ca. 40-100 m.
6. July 12, 1964.
- 953 Ipomoea sp. (Convolvulaceae) (det. D. D. Soejarto)
1. Climber. Flowers violet, showy. Latex abundant, creamy.
2. Stem, leaves, flowers.
3. Dpto. de Nariño, Mpio. Tumaco, between Espriella and La Guayacana.
4. Common, scattered.
5. Secondary growth, near swamp. Alt. ca. 40-100 m.
6. July 12, 1964.
- 957 Psychotria sp. (Rubiaceae) (det. D. D. Soejarto)
1. Tree, 20 m. tall, 15 cm. Bark smooth. Flowers pale green, fruits yellowish-green.
2. Wood, bark, leaves, flowers, fruits.
3. Dpto. de Nariño, Mpio. Tumaco, outside La Guayacana in the direction of Pasto, 89 km. from Tumaco.
4. Common.
5. Very humid rain-forest. Alt. ca. 50-100 m.
6. July 12, 1964.
- 958
1. Shrubby herb, ca. 1 m. tall. Upper surface of leaves dark green, lower one grayish green. Flowers pale green, pale yellow at the upper surface of the flared petals.
2. All parts of the plant.
3. Dpto. de Nariño, Mpio. Tumaco, La Guayacana, 89 km. from Tumaco.
4. Frequent.
5. Very humid rain-forest, especially at the edge. Alt. ca. 100 m.
6. July 12, 1964.

- 959 Banara cf. mollis (Flacourtiaceae) (det. D. D. Soejarto)
1. Shrub, ca. 3 m. tall. Petals yellowish-green, sepals pale green.
2. Wood, bark, flowers.
3. Dpto. de Nariño, Mpio. Tumaco, La Guayacana, roadside to El Diviso.
4. Rather common.
5. Very humid rain-forest (fringe). Alt. ca. 100 m.
6. July 12, 1964.
- 960 Viburnum
1. Treelet or shrub, 3 m. tall. Flowers white, fruits green.
2. Wood, bark, leaves, flowers, fruits.
3. Dpto. de Nariño, Mpio. Ricaurte, Cartagena village, bank of Rio Guiza.
4. Common.
5. River bank or near cultivated areas. Alt. ca. 1800 m.
6. July 13, 1964.
7. "Pelotillo."
- 961
1. Shrub, 1/2 - 1 m. tall. Bracts dark purple, flowers white.
2. All parts of the plant.
3. Dpto. de Nariño, Mpio. Ricaurte, Cartagena village, bank of Guiza.
4. Common.
5. River bank or undisturbed rain-forest. Alt. ca. 1800 m.
6. July 13, 1964.
- 963 Anthurium aff. rivulorum Engl. (Araceae) (det. D. D. Soejarto)
1. Herb. Inflorescences dark purple, fruits dark purple.
2. All parts of the plant.
3. Dpto. de Nariño, Mpio. Ricaurte, Cartagena village, bank of Rio Guiza.
4. Abundant, in groups.
5. Rheophyte, with strong rooting system, within the reach of water level. Alt. ca. 1800 m.
6. July 13, 1964.
- 964 Eugenia
1. Tree, 25 m. tall, 25 cm. Bark smooth. Fruits green, dark red or black when ripe, juicy, sweet, edible.
2. Wood, bark, leaves, fruits.
3. Dpto. de Nariño, Mpio. Ricaurte, Cartagena village, bank of Rio Guiza.
4. Rather rare.
5. River bank. Alt. ca. 1800 m.
6. July 13, 1964.
7. "Guel."
- 974 Sinlocamphyllus sp (Campanulaceae) (det. D. D. Soejarto)
1. Straggling shrub, ca. 1 m. tall. Lower surface of the leaves brownish-green. Latex creamy, stem dull purple. Sepals pale brownish-yellow, petals bright red.
2. Stem, leaves, flowers.
3. Dpto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Very common.
5. Humid mountain forest. Alt. ca. 2800 m.
6. July 17, 1964.

976 Weinmannia sp. (Cunoniaceae) (det. D. D. Scajarto)

1. Shrub, about 3 m. tall. Fruits dark maroon. Sepals pale green, petals pale green.
2. Stem, fruits, flowers, leaves.
3. Dpto. de Narifio, Mpio. Pasto, Bosque Botana.
4. Common, in groups.
5. Humid mountain forest. Alt. ca. 2900 m.
6. July 17, 1964.

978

1. Epiphytic or terrestrial herbs. Inflorescences orange in overall appearance; individual bracts deep orange. Sepals yellow, petals dirty white.
2. All parts of the plant.
3. Dpto. de Narifio, Mpio. Pasto, Bosque Botana.
4. Very common, in groups or scattered.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 17, 1964.

979 Desfontainea spinosa (Loganiaceae) (det. D. D. Scajarto)

1. Shrub, 2 m. tall. Sepals pale yellow with purple tint, petals maroon to red outside, yellow at the apex.
2. Stem, leaves, flowers, fruits.
3. Dpto. de Narifio, Mpio. Pasto, Bosque Botana.
4. Rare, scattered.
5. Humid mountain forest. Alt. ca. 3000 m.
6. July 17, 1964.

981 Psychotria sp.

1. Shrub, 2-4 m. tall. Flowers dull purple-blue, fruits dull dark-green.
2. Stem, leaves, fruits, flowers.
3. Dpto. de Narifio, Mpio. Pasto, Bosque Botana.
4. Common, in groups.
5. Humid mountain forest. Alt. ca. 3000 m.
6. July 17, 1964.

983

1. Shrub, 2-3 m. tall. Inflorescences covered by sticky glands all over. Bracts reddish-purple, flowers pink. Ripe fruits dark pink. Bark peeling off, brown.
2. Stem, leaves, flowers, fruits.
3. Dpto. de Narifio, Mpio. Pasto, Bosque Botana.
4. Common
5. Humid mountain forest. Alt. ca. 3200 m.
6. July 17, 1964.

985 Clethra sp. (Clethraceae) (det. D. D. Scajarto)

1. Shrub to treelet, 2-3 m. tall, with abundant fruits, which are brown. The flowers are white, and the sepals brown.
2. Bark, wood, leaves, flowers, fruits.
3. Dpto. de Narifio, Mpio. Pasto, Bosque Botana.
4. In groups, rather common.
5. Humid mountain forest. Alt. ca. 3200 m.
6. July 17, 1964.

987 Hedyosmum sp. (Chloranthaceae) (det. D. D. Soejarto)

1. Shrub. Fruits green.
2. Stem leaves, fruits.
3. Dpto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Rather rare, scattered.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 17, 1964.

989

1. Treelet, 4 m. tall. Fruits maroon, flowers pale green.
2. Wood, bark, leaves, fruits, flowers.
3. Dpto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Very rare.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 17, 1964.

991

(Melastomaceae)

1. Tree, 20 m. tall, 25 cm. Flowers pink.
2. Wood, bark, leaves, flowers.
3. Dpto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Very rare.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 17, 1964.

993 Solanum hispidum (Solanaceae) (det. D. D. Soejarto)

1. Data missing.

994

(Compositae)

1. Data missing.

995

(Ericaceae)

1. Data missing.

997 Capsicum sp. (Solanaceae)

1. Data missing.

999

1. Treelet, 4 m. tall. Flowers white.
3. Epto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Rare.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 18, 1964.

2000 Plantago sp. (Plantaginaceae) (det. D. D. Soejarto)

1. Herb.
2. Whole plant.
3. Dpto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Common.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 18, 1964.
7. "Junin."

1002

1. Data missing.

1010 Verbena sp. (Verbenaceae) (det. D. D. Soejarto)

1. Small shrub, fragrant small, flowers purple.
2. Whole plant.
3. Dpto. de Nariño, Mpio. Pasto, Bosque Botana.
4. Common.
5. Humid mountain forest, alt. ca. 2900 m.
6. July 18, 1964.
7. Used as remedy of cold. "Berbena."

1017 Physalis sp. (Solanaceae) (det. D. D. Soejarto)

1. Small shrub, very abundant. Sepals dark green, petals pale green with purple longitudinal stripes outside. Fruits green, orange when ripe.
2. Stem, leaves, fruits and flowers.
3. Dpto. de Nariño, Mpio. Pasto, Volcano La Galera, alt. ca. 2490 - 3800 m.
4. Common, in groups.
5. Páramo.
6. July 22, 1964.
7. "Yerba mora."

1022 Gaiadendron sp. (Loranthaceae)

1. Treelet, 3 m. tall.
2. Wood, bark, leaves, flowers.
3. Dpto. de Nariño, Mpio. Pasto, Volcano La Galera.
4. Rare, scattered.
5. Páramo, alt. ca. 3600 m.
6. July 22, 1964.

1025 Oreopanax sp. (Araliaceae) (det. D. D. Soejarto)

1. Treelet, 4 m. tall, 7 cm. Lower surface of leaves brown, upper surface deep green. Perianth pale green, with tinge of dull purple color at the apex outside. Anthers yellow.
2. Wood, bark, leaves, fruits.
3. Dpto. de Nariño, Mpio. Pasto, Volcano La Galera.
4. Rather common.
5. Páramo, alt. ca. 3600 m.
6. July 22, 1964.

1026 Loricaria sp. (Compositae) (det. D. D. Soejarto)

1. Shrub, 25 - 100 cm. tall. Flowers dull white.
2. Stem, leaves, flowers.
3. Dpto. de Nariño, Mpio. Pasto, Volcano La Galera.
4. Abundant.
5. Páramo, alt. ca. 3600 m.
6. July 22, 1964.

- 1049 (Melastomaceae)
1. Treelet, 5 m. tall. Flowers deep violet. Lower surface of leaves gray-green, upper surface dark green. Sepals dull maroon, petals in bud black.
 2. Wood, bark, leaves, flowers.
 3. Comisaria del Putumayo, Valle de Sibundoy, above Santiago.
 4. Rare, scattered.
 5. Mountain forest, alt. ca. 2500 m.
 6. July 24, 1964.
- 1054 Rapanea sp. (Myrsinaceae) (det. D. D. Soejarto)
1. Treelet, 4 m. tall. Fruits green.
 2. Stem, leaves, fruits.
 3. Dpto. de Narino, Bio. Pasto, Páramo de Tabano.
 4. Rare.
 5. Páramo, alt. ca. 3000 m.
 6. July 24, 1964.
- 1057
1. Small, prostrate herb. Flowers minute, very pale yellow, fruits red, juicy.
 2. All parts of the plant.
 3. Dpto. de Narino, Bio. Pasto, Páramo de Tabano.
 4. Abundant, in groups.
 5. Páramo, alt. ca. 3000 m.
 6. July 24, 1964.
- 1058 Solanum sp. (Solanaceae) (det. D. D. Soejarto)
1. Shrub, 2 m. tall, lower surface of leaves silvery. Scales silvery all over. Sepals silvery-gray to brown, petals pale violet, lower surface silvery. Stamens yellow.
 2. Stem, leaves, flowers.
 3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
 4. Rather common.
 5. Very humid subtropical forest, alt. 2080 m.
 6. July 25, 1964.
- 1059 ?Cordia sp. (Boraginaceae) (det. D. D. Soejarto)
1. Treelet, 6 m. tall. Lower surface of leaves silvery green, upper surface dark green. Flower buds green.
 2. Wood, bark, leaves, flowers.
 3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
 4. Rare.
 5. Very humid subtropical forest, alt. ca. 2080 m.
 6. July 25, 1964.
- 1060 Liabum volcanica (Compositae) (det. R. Jaramillo & D. Soejarto)
1. Shrub, 2-4 m. tall, with creamy latex. Flowers yellow.
 2. Stem, leaves, flowers.
 3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
 4. Common.
 5. Very humid subtropical forest, alt. ca. 2080 m.
 6. July 25, 1964.

- 1061 (Melastomaceae)
1. Tree, 15 m. tall, 20 cm. Bark smooth, lower surface of young leaves dark purple, upper surface green. Fruits green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.
- 1062 Cestrum sp. (Solanaceae) (det. D. D. Soejarto)
1. Treelet, 3-5 m. tall. Flowers dark purple.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather common.
5. Very humid subtropical forest, alt. ca. 2080 m.
6. July 25, 1964.
- 1063 Piper sp. (Piperaceae) (det. D. D. Soejarto)
1. Treelet, 5 m. tall. Lower surface of leaves grayish-green. Inflorescences green.
2. Bark, wood, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.
- 1066 Hyeronima sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Treelet, 12 m. tall, perianth white, green at the base.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.
- 1068
1. Small shrub, 1 m. tall. Flowers white, fruits green.
2. Stem, leaves, flowers, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.
- 1069
1. Shrub, 3-4 m. tall. Sepals green, petals white.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare, in groups.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1071 Canna sp. (Cannaceae) (det. D. D. Soejarto)

1. Herb. Glume pale green, perianth orange.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, in groups.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1072 (Capparidaceae)

1. Shrub, 3 m. tall. Sepals green, petals pale green, fruits green, persistent stigmas black.
2. Stem, leaves, flowers/fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare.
5. Humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1074 Solanum sp. (Solanaceae) (det. D. D. Soejarto)

1. Small shrub. Petals blue, sepals dull blue, fruits black when ripe.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. In groups.
5. Humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1075 (Malastomaceae)

1. Tree, 10 m. tall, flower buds white at the apex, green at the base.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather frequent, scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1076 (Ericaceae)

1. Tree, 4 m. tall. Sepal-tube pale green, petals white.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather frequent.
5. Very humid subtropical forest, alt. ca. 2080 m.
6. July 25, 1964.

1077 Saurauia putumayonis (Actinidiaceae) (det. D. D. Soejarto)

1. Treelet, up to 12 m. tall, 10 cm. Bark smooth, brown. Wood pale brown. Flowers white, stamens yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Very frequent.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1078 Clusia sp. (Guttiferae) (det. D. D. Soejarto)

1. Tree, 13 m. tall, flower buds green, petals green. Lower surface of leaves grayish-green.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare, scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1965.

1079 Inga sp. (Leguminosae) (det. D. D. Soejarto)

1. Treelet, 3-5 m. tall. Perianth pale green, dark green at base, stamens very pale green.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1080 Ilex sp. (Aquifoliaceae) (det. D. D. Soejarto)

1. Tree, 12 m. tall. Flowers white, fruits green.
2. Wood, bark, leaves, flowers/fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1084 Cleome sp. (Capparidaceae) (det. D. D. Soejarto)

1. Shrub. Flowers orange.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1085 (Melastomaceae)

1. Tree, 15 m. tall. Lower surface of leaves reddish-brown. Fruits green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1086

1. Treelet, 10 m. tall. Sepals green, petals white.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
- 4.
5. Very humid subtropical forest, alt. 2080 m.
6. July 25, 1964.

1087 Croton sp. (Euphorbiaceae) (det. D. D. Soejarto)

1. Tree, 20 m. tall, 20 cm. Bark smooth, with dull yellow latex. Fruits brown, lower surface of leaves, esp. when young, with brown scales.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, scattered.
5. Very humid subtrropical forest, alt. 2080 m.
6. July 26, 1964.

1088 ? Cordia sp. (Boraginaceae) (det. D. D. Soejarto)

1. Same as #1059, same locality.

1089 (Boraginaceae)

1. Tree, 12 m. tall, 15 cm. Bark rather smooth. Fruits green. Lower surface of leaves grayish-green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1090 Phyllanthus sp. (Euphorbiaceae) (det. D. D. Soejarto)

1. Shrub. Flowers pale green, fruits green.
2. Stem, leaves, flowers/fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, in groups.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1091 Capsicum sp. (Solanaceae) (det. D. D. Soejarto)

1. Shrub, 1-2 m. tall, perianth white, stamens yellow, stigma white.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, in clumps, in very damp places (below waterfall, f.e.)
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1092 Physalis sp. (Solanaceae) (det. D. D. Soejarto)

1. Shrub, 1-2 m. tall. Perianth pale green, stamens white with a slight bluish tinge, style green, fruits green.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, in clumps, in very damp places.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1094 (Vitaceae)

1. Climber. Lower surface of midvein purplish-red, flowers pale green.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1095 Lichen

1. Thallus dirty white, fruiting bodies brown.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires
4. Abundant, along damp rock surfaces.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1098 Merriania nobilis (Melastomaceae) (det. D. D. Soejarto)

1. Tree, 5 m. tall. Sepa-cup greenish-yellow, petals orange-red to bright red. Filaments reddish-violet, staminodia yellow at the apices, hook deep violet. The flowers are very showy.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare, scattered.
5. Very humid, subtropical forest, alt. 2080 m.
6. July 26, 1964.

1105 Begonia sp. (Begoniaceae) (det. D. D. Soejarto)

1. Herb. Flowers bright red.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, in groups, in very damp places.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1106 Pilea multiflora (Urticaceae) (det. D. D. Soejarto)

1. Herb. Inflorescences purple. Crushed parts of the stem exude fragrant smell.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Abundant, in groups, in very wet places.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1108 Lichen

1. Thallus dirty white. Fruiting bodies black.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Abundant, along damp rock surfaces.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

1110 Escallonia sp. (Saurifragaceae) (det. D. D. Soejarto)

1. Tree, 10 m. tall. Sepal-cup green, petals white.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.

- 1111 Ilex sp. (Aquifoliaceae) (det. D. D. Soejarto)
1. Tree, 10 m. tall, 8 cm. Fruits black.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.
- 1112 Hedyosmum sp. (Chloranthaceae) (det. D. D. Soejarto)
1. Tree, 11 m. tall. Fruits green.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare, scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.
- 1113 Eupatorium sp. (Compositae) (det. D. D. Soejarto)
1. Treelet, 8 m. tall. Lower surface of leaves silvery-gray. Fruits dry.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather frequent.
5. Very humid subtropical forest, alt. 2080 m.
6. July 26, 1964.
- 1118 Monnina sp. (Polygalaceae) (det. D. D. Soejarto)
1. Treelet, 4 m. tall. Flowers dark-violet with yellow tinge.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common, scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1119 (Melastomaceae)
1. Treelet, 3 m. tall (shoots growing on felled trunk). Inflorescences green.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare. Scattered.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1122 (Boraginaceae)
1. Tree, 8 m. tall, 9 cm. Flowers dull purple at the apex, white at the base of the tube. Fruits green. Lower surface of leaves grayish-brown, upper one dark green. Stipules purple to brown.
2. Wood, bark, leaves, flowers/fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Common.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1123 Struthanthus sp. (Loranthaceae) (det. D. D. Soejarto)
1. Epiphytic. Flowers dull white, fruits orange to red.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.

- 1124 Cordia sp. (Boraginaceae) (det. D. D. Soejarto)
1. Treelet, 7 m. tall, flowers white, fruits green.
2. Wood, bark, leaves, flowers/fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1128 Billia columbiana (Hipocastanaceae) (det. D. D. Soejarto)
1. Treelet, 6 m. tall, 8 cm. Flower buds dull greenish-purple.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rather rare, scattered.
5. Very humid subtrropical forest, alt. 2080 m.
6. July 27, 1964.
- 1129 Hieronyma sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Shrub. Lower surface of leaves pale green, upper surface dark green.
Fruits black.
2. Stem, leaves.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Extremely rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1133 Mikania sp. (Compositae) (det. D. D. Soejarto)
1. Climber, fruits green, dark red when ripe.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4. Rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1137 ?Psychotria sp. (Rubiaceae) (det. D. D. Soejarto)
1. Treelet, 10 m. tall, 12 cm. Flowers yellow, fruits green.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Buenos Aires.
4.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1138 Theobroma sp. (Sterculiaceae) (det. D. D. Soejarto)
1. Tree, 30 m. tall, 30 cm. Bark smooth, brown. Fruits brown, bitter.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, alt. 2080 m.
4. Extremely rare.
5. Very humid subtropical forest, alt. 2080 m.
6. July 27, 1964.
- 1152 Simplocos sp. (Simplocaceae) (det. D. D. Soejarto)
1. Treelet, 4 m. tall. Sepals greenish-yellow, petals deep pink, reflexed. Anthers united, pink.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Very rare.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.

- 1153 Hedyosmum sp. (Chloranthaceae) (det. D. D. Soejarto)
1. Treelet, 4 m. tall. Fruits creamy white, very juicy.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Rather common.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
- 1155 Clusia sp. (Guttiferae) (det. D. D. Soejarto)
1. Treelet, 5 m. tall. Latex creamy white. Fruits pale green with purplish-red tinge, persistent stigmas black. Lower surface of leaves grayish-green, upper surface dark green. The ripe fruits split open, the seeds bright orange-red.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Scattered, rather common.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
- 1157 Psychotria sp. (Rubiaceae) (det. D. D. Soejarto)
1. Treelet, 4-5 m. tall. Flowers deep pink, fruits green.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Common.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
- 1158 Saurauia portachuelensis (Actinidiaceae) (det. D. D. Soejarto)
1. Treelet, 5 m. tall, 10 cm. Flowers white.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Common.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
- 1159 Asplundia sp. (Cyclanthaceae) (det. D. D. Soejarto)
1. Small shrub, 1-3 m. tall. Fruits dark red, inflorescences appear red.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Common, in groups.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
- 1160 Treefern
1. Tree, 2-4 m. tall. Sori brown.
2. Stem, leaves.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Very common.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
- 1161 Schleffera sp. (Araliaceae) (det. D. D. Soejarto)
1. Treelet, profusely branched. Lower surface leaves brownish-green, upper surface dark green. Flowers brown, fruits green.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Cerro Portachuelo, Point Siberia.
4. Common, scattered.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.

1162 Juncus ?bogotensis (Juncaceae) (det. D. D. Soejarto)

1. Herb, very abundant. Inflorescences brown.
2. Whole plant.
3. Comisaria del Putumayo, Cerro Portachualo, Point Siberia.
- 4.
5. Very humid subtropical forest, alt. 2400 m.
6. July 28, 1964.
7. "Totora."

1170 (Bignoniaceae)

1. Tree, 7 m. tall. Flowers pale violet, inner surface of petal tube with deep dark violet stripes which run longitudinally, upper surface of lips with violet tinge, sepals green.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Valle de Sibundoy, in a village-garden of Sibundoy.
4. Rare, cultivated.
5. Alt. ca. 2200 m.
6. July 28, 1964.

1172 (Compositae)

1. Treelet, 3 m. tall, sterile.
2. Stem, leaves, roots.
3. Comisaria del Putumayo, Cerro San Antonio, above Valle de Sibundoy.
4. Extremely rare, sometimes cultivated.
5. Alt. ca. 2300 m., subtrropical forest.
6. July 29, 1964.
7. Bark toasted and taken with sugar used as preservative against syphilis.

1172 (Compositae)

1. Straggling shrub, flowers dry.
2. Stem, leaves, dry flowers.
3. Comisaria del Putumayo, Cerro San Antonio, above Valle de Sibundoy.
4. Exceptionally rare, sometimes cultivated.
5. Alt. ca. 2350 m., subtropical forest.
6. July 29, 1964.
7. Bark toasted and taken with sugar for preservative against syphilis.

1200

1. Tree, ca. 6 m. tall, flowers red.
2. Wood, bark, leaves, flowers.
3. Dpto. de Nariño, Mpio. Pasto, above Pasto in the direction to Buesáco.
4. Rare, in clumps.
5. Roadside, edge of semi-dry subtrropical forest, alt. ca. 3000 m.

1202 Siparuna sp. (Monimiaceae) (det. D. D. Soejarto)

1. Shrub, 4 m. tall, all over with a sweetish smell. Lower surface of leaves grayish-green, upper surface dark green. Flowers yellow to deep orange, fruits green.
2. Wood, bark, leaves, flowers.
3. Dpto. de Nariño, Mpio. Pasto, above Pasto in the direction to
4. Rare.
5. Roadside, secondary growth, alt. ca. 3000 m.
6. July 3, 1964.

1203 (Dioscoreaceae)

1. Climber. Flowers green.
2. Whole plant, except roots.
3. Dpto. de Nariño, Mpio. Pasto, above Pasto in the direction to Buesaco.
4. Common.
5. July 3, 1964.

Collector: D. D. Soejarto, H. W. Vogelmann, F. C. Olday, E. Hernández

- 1209 (Convolvulaceae)
1. Climber, latex white. Flower-tube white, lips pinkish-violet to lavender.
 2. Whole plant but roots.
 3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
 4. Rather common.
 5. Secondary growth, along ravine, alt. 800 m.
 6. August 6, 1964.
- 1210 (Melastomaceae)
1. Shrub, 2 m. tall, fruits red, turning deep blue or black when ripe.
 2. Stem, leaves, fruits.
 3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
 4. Rare.
 5. Secondary growth, along ravine, alt. 800 m.
 6. August 6, 1964.
- 1211 (?Anacardiaceae)
1. Treelet, 5 m. tall, the bark smooth, sap colorless which turns deep yellow after exposure. Fruits green. A sweet smell is exuded by the crushed leaves.
 2. Wood, bark, leaves, fruits.
 3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
 4. Rather common.
 5. Secondary growth, along ravine, alt. ca. 800 m.
 6. August 6, 1964.
- 1212 Mikania sp. (Compositae) (det. D. D. Soejarto)
1. Climber, flowers white, sap colorless.
 2. Stem, leaves, flowers.
 3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
 4. Common.
 5. Secondary growth, along ravine, alt. 800 m.
 6. August 6, 1964.
- 1214 Cissus sp. (Vitaceae) (det. D. D. Soejarto)
1. Climber. Corolla mottled maroon, with green veins.
 2. Whole plant.
 3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
 4. Common.
 5. Secondary growth, along ravine, alt. 800 m.

- 1215 (Asclepiadaceae)
1. Climber, latex creamy, abundant; sterile.
2. Roots, stem, leaves.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Common.
5. Secondary growth, along ravine, alt. 800 m.
6. August 6, 1964.
- 1216 Urena sp. (Urticaceae) (det. D. D. Soejarto)
1. Treelet, 3 m. tall. Peduncle and pedicel purplish-red, flowers milky-white.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Secondary growth, along ravine, alt. 800 m.
6. August 6, 1964.
- 1217 (Apocynaceae)
1. Climber, latex copious, creamy, wood soft, fruits green.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Secondary growth, along ravine, alt. 800 m.
6. August 6, 1964.
- 1218 Warszewiczia sp. (Rubiaceae) (det. D. D. Soejarto)
1. Treelet, 4 m. tall, lower surface of young leaves purple, bracts deep red, flowers green.
2. Wood, bark, leaves, bracts.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare, scattered.
5. Secondary growth, along ravine and river, alt. 800 m.
6. August 6, 1964.
- 1219 (Gesneriaceae)
1. Small herb, lower surface of leaves purplish-red, upper surface bluish-green, flowers red/bright red, inner surface of sepals green, outer surface maroon.
2. Whole plant.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rather abundant, in clumps.
5. Very wet places in depressions and crevices, along ravine, alt. 800 m.
6. August 6, 1964.
- 1220 Urena sp. (Urticaceae) (det. D. D. Soejarto)
1. Treelet, 18 ft. tall. Flowers white with a slight pink tinge.
2. Stem, leaves.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rather common.
5. Secondary growth, along ravine or riverbank, alt. 800 m.
6. August 6, 1964.

- 1221 Jussiaea sp. (Onagraceae) (det. D. D. Soejarto)
1. Small herb, sepals green, petals yellow, fruits maroon.
2. Whole plant.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Abundant.
5. Grass field, along ravine, alt. 800 m.
6. August 6, 1964.
- 1223 ?Psychotria sp. (Rubiaceae) (det. D. D. Soejarto)
1. Tree, 7 m. tall, bark smooth. Fruits dark green, turning black when ripe. Perianth tube pale violet, peduncle and pedicel deep violet.
2. Wood, bark, leaves, fruits, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Common.
5. Secondary growth, along ravine, alt. 800 m.
6. August 6, 1964.
- 1224 Solanum sp. (Solanaceae) (det. D. D. Soejarto)
1. Tree, 10 m. tall. Peduncles and pedicels grayish-green, petals lavender, sepals grayish-green, stamens yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Rather rare.
5. Secondary growth, along ravine, alt. 800 m.
6. August 6, 1964.
- 1225 Cytharexylum poeppigii (Verbenaceae) (det. D. D. Soejarto)
1. Tree, 25 m. tall, 25 cm. Fruits orange, turning deep bright red when ripe, bitter. Flowers white. Fruits usually eaten by bats.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Pasture, remains of primary forest, alt. 800 m.
6. August 6, 1964.
- 1226 Arabidaea florida (Bignoniaceae) (det. D. D. Soejarto)
1. Climber, flowers pinkish-white, snowy, fragrant.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Rather rare.
5. Edge of pasture, remnants of primary forest, alt. 800 m.
6. August 6, 1964.
- 1227 (Rubiaceae)
1. Treelet, 4 m. tall. Inflorescences white, sepals pale green, petals white.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4.
5. Remnants of forest, along river bank, alt. 800 m.
6. August 7, 1964.

- 1228 Bellucia grossularioides (Melastomaceae) (det. D. D. Soejarto)
1. Tree, 25 m. tall. Sepals green, petals white, anthers white with yellow tinge. Cauliflorous.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Rather rare.
5. Rest of forest, along riverbank, alt. 800 m.
6. August 7, 1964.
- 1229 Bauhinia sp. (Leguminosae) (det. D. D. Soejarto)
1. Tree, 15 m. tall. Fruits dry.
2. Wood, bark, leaves, dry fruits.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Quite common.
5. Remnants of forest, riverbank, alt. 800 m.
6. August 7, 1964.
- 1230 (?Apocynaceae)
1. Data missing.
- 1231 ?Abuta sp. (Menispermaceae)
1. Climber, flowers pale yellow.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Common.
5. Riverbank, rest of forest, alt. 800 m.
6. August 7, 1964.
- 1232 (Leguminosae)
1. Climber, flowers green.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Rare
5. Riverbank remnants of forest, alt. 800 m.
6. August 7, 1964.
- 1234 ?Oleaceae
1. Shrub, 5 m. tall, fruits green,
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Common.
5. Secondary growth, along ravine, alt. 800 m.
6. August 7, 1964.
- 1235 Sapium sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Tree, 10 m. tall, latex white, flowers pale yellow, inflorescences greenish-yellow.
2. Wood, bark, leaves, flowers/fruits.
3. Comisaria del Putumayo, Rio Rumbaco, above the confluence with Rio Mocoa.
4. Rather rare.
5. Secondary growth, along ravine, alt. 800 m.
6. August 7, 1964.

1236 Oliganthes sp. (Compositae) (det. D. D. Soejarto)

1. Tree, 20 m. tall, 20 cm., fruits dull white.
2. Wood, bark, leaves, flowers/fruits.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Riverbank, rest of forest, alt. 800 m.
6. August 7, 1964.

1237

1. Treelet, 6-7 m. tall, fruits green.
2. Datum missing.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Datum missing.
5. Riverbank, rest of forest, alt. 800 m.
6. August 7, 1964.

1238 Hyeronima alchorneoides (Euphorbiaceae) (det. D. D. Soejarto)

1. Tree, 30 m. tall, 35 cm., fruits green.
2. Wood, leaves, bark.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Remnants of forest, near riverbank, alt. 800 m.
6. August 7, 1964.

1239 Marila sp. (Guttiferae) (det. D. D. Soejarto)

1. Tree, 15 m. tall, fruits yellowish-green. Lower surface of leaves brownish-green, upper surface dark green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare, scattered.
5. Remnants of forest, along riverbank, alt. 800 m.
6. August 7, 1964.

1240

(Annonaceae)

1. Tree, 15 m. tall, fruits green. Lower surface of leaves gray, upper surface dark green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, along riverbank, alt. 800 m.
6. August 7, 1964.

1241

(Leguminosae)

1. Tree, 24 m. tall, fruits green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rather rare.
5. Remnants of forest, along riverbank, alt. 800 m.
6. August 7, 1964.

1242 Araliaceae

1. Treelet, 6 m. tall, fruits green, turning purplish-red when ripe.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Rio Rungaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, along riverbank, alt. 800 m.
6. August 7, 1964.

1243 Inga sp. (Leguminosae) (det. D. D. Szejarto)

1. Tree, 20 m. tall, sepals pale yellow, petals pale yellow, stamens green.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Rio Rungaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, along riverbank, alt. 800 m.
6. August 7, 1964.

1244

1. Shrub, 1-2 m. tall, perianth pink, stamens yellow, fruits red, turning black when ripe.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Rungaco, above the confluence with Rio Mocoa.
4. Data missing.
5. Remnants of forest, along riverbank, alt. 800 m.
6. August 7, 1965.

1245

1. Shrub, 3 m. tall, sepals green, petals white.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Rungaco, above the confluence with Rio Mocoa.
4. Data missing.
5. Remnants of forest, near riverbank, alt. 800 m.
6. August 7, 1964.

1246 Siparuna sp. (Monimiaceae) (det. D. D. Szejarto)

1. Shrub, 4 m. tall, sepals green, petals yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Rio Rungaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, along ravine, alt. 800 m.
6. August 7, 1964.

1247 Marcgravia sp. (Marcgraviaceae) (det. D. D. Szejarto)

1. Straggling shrub, fruits purple.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Rungaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, along riverbank of Rio Mocoa.
6. August 7, 1964.

- 1253 Dichanetalum sp. (Dichapetalaceae) (det. D. D. Soejarto)
1. Struggling shrubs flowers gray, fruits green.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Rio Mocoa, above the confluence with Rio Ruyaco.
4. Rare.
5. Remnants of primary forest, along riverbank, alt. 800 m.
6. August 7, 1964.
- 1254 Maranthaceae
1. Herb, 1 1/4 m. tall. Glumes orange, showy, sepals orange, petals white.
2. All parts of the plant.
3. Comisaria del Putumayo, along Rio Ruyaco, above the confluence with Rio Mocoa.
4. In groups, very common.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1255 Melastomaceae
1. Straggling shrub, bracts green, sepals green, petals violet.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. In groups.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1256 Alchornea sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Treelet, 8 m. tall, flowers green, fruits green.
2. Stem, flowers and fruits.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1257 Rubiaceae
1. Shrub, 1-2 m. tall. Flowers white, fruits dark blue, turning translucent pale blue when ripe.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Common.
5. Remnants of primary forest, alt. 800 m.
6. August 8, 1964.
- 1260 Gesneriaceae
1. Shrub, flowers yellow to orange, showy.
2. Data missing.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Common, in group.
5. Remnants of forest, 800 m. alt.
6. August 8, 1964.

- 1261 Cenbaelis sp. (Rubiaceae) (det. D. D. Soejarto)
1. Shrub, 1-2 m. tall. Bracts bright red, flowers yellow, fruits blue.
2. All parts of the plant.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Common, scattered.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1265 Ficus sp. (Moraceae) (det. D. N. Soejarto)
1. Tree, 25 m. tall. Fruits green. Latex creamy, abundant.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1266 Trichilia sp. (Meliaceae) (det. D. N. Soejarto)
1. Tree, 20 m. tall, flowers pale yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1267 Cassia sp. (Leguminosae) (det. D. D. Soejarto)
1. Shrub, 4 m. tall, sepals green, petals orange-yellow, fruits green.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Along streamlet, alt. 800 m.
6. August 8, 1964.
- 1268 Pleurothyrium aff. krukovi (Lauraceae) (det. D. D. Soejarto)
1. Tree, 30 m. tall, \varnothing 25 cm. Perianth greenish-yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1269 Topirixia sp. (Anacardiaceae) (det. D. D. Soejarto)
1. Treelet, 4 m. tall, sepals yellow, petals yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.

- 1270 Cupania sp. (Sapindaceae) (det. D. D. Soejarto)
1. Shrub, 4 m. tall. Lower surface of leaves gray, upper surface dark green. Fruits green.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, near the bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Remnants of forest, alt. 800 m.
6. August 8, 1964.
- 1271 Melastomaceae
1. Straggling shrub, fruits green to purple, peduncles and pedicels purplish-red.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Common.
5. Along rocky riverbank, alt. 800 m.
6. August 8, 1964.
- 1272 Lauraceae
1. Treelet, 7 m. tall. Lower surface of leaves glaucous, flowers pale yellow.
2. Stem, leaves.
3. Comisaria del Putumayo, bank of Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very common.
5. Along rocky riverbank, alt. 800 m.
6. August 8, 1964.
- 1273 Acalypha sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Straggling shrub, inflorescences green.
2. Stem, leaves.
3. Comisaria del Putumayo, bank of Rio Ruyaco, above the confluence of Rio Mocoa.
4. Very common.
5. Along rocky riverbank.
6. August 8, 1964.
- 1274 Geogenanthus ciliatus (Commelinaceae) (det. D. D. Soejarto)
1. Small herb. Upper surface of leaves dark bluish-green, lower surface purple.
2. All parts of plant, except flowers and fruits.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Ruyaco with Rio Mocoa.
4. Common.
5. Dark, humid, shady, rocky habitat.
6. August 8, 1964.
7. "Oreja de negro."
- 1275 Annonaceae
Data missing
(Comisaria del Putumayo, at the vicinity of the confluence of Rio Ruyaco with Rio Mocoa).

- 1276 Piper sp. (Piperaceae) (det. D. D. Soejarto)
1. Treelet, 6 m. tall. Inflorescences white.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Rungaco and Rio Moccoa.
4. Rather common.
5. Edge of pastures, 800 m. alt.
6. August 9, 1964.
- 1277 Siparuna anisoclype (Monimiaceae) (det. D. D. Soejarto)
1. Treelet, 6 m. tall, flowers green to yellow with green receptacle.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Rungaco and Rio Moccoa.
4. Rare.
5. Remnants of forest, 800 m. alt.
6. August 9, 1964.
- 1278 Scoparia dulcis (Scrophulariaceae=) (det. D. D. Soejarto)
1. Small herb, sepals green, petals white, stamens white, fruits green.
2. All parts of the plant.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Rungaco with Rio Moccoa.
4. Common.
5. Ruderal habitat, near houses, alt. 800 m.
6. August 9, 1964.
7. Used medicinally by the natives.
- 1279 Desmodium sp. (Leguminosae) (det. D. D. Soejarto)
1. A creeping herb, flowers violet, fruits green.
2. All parts of the plant.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Rungaco with Rio Moccoa.
4. Common.
5. Pastures, alt. 800 m.
6. August 9, 1964.
- 1280 ? Lythraceae
1. Small woody herb, flowers pink violet.
2. All parts of the plant.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Rungaco with Rio Moccoa.
4. Common.
5. Abandoned field, ruderal habitat, alt. 800 m.
6. August 9, 1964.
- 1281 Labiatae
1. Small herb.
2. All parts of the plant.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Rungaco with Rio Moccoa.
4. Common.
5. Near houses, semi-cultivated, alt. 800 m.
6. August 9, 1964.
7. Used medicinally by the natives.

1282 Chenopodiaceae

1. Herb.
2. All parts of the plant.
3. Comisaria del Putumayo, at the vicinity of the confluence of Rio Ruyaco with Rio Mocoa.
4. Common.
5. Cultivated in gardens, alt. 800 m.
6. August 9, 1964.
7. Used medicinally by the natives.

1285 Solanaceae

1. Shrub, 2 m. tall. Flowers pale green, fruits green, stamens pale yellow-gray.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Vicinity of primary forest, alt. 800 m.
6. August 9, 1964.

1286 Apocynaceae

1. Treelet, 5 m. tall. Lower surface of leaves gray-green, glossy, upper surface dark green. Flowers white.
2. Stem, leaves.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Common.
5. Vicinity of primary forest, alt. 800 m.
6. August 9, 1964.

1287 Rubiaceae

1. Treelet, 5 m. tall. Flowers: outer surface of petal-tube green, inner surface yellow.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Rare.
5. Primary forest, alt. 800 m.
6. August 9, 1964.

1288 Euphorbiaceae

1. Tree, 20 m. tall, ϕ 15 cm. Bark smooth. Flowers pale yellow, fruits green.
2. Wood, bark, leaves, fruits, flowers.
3. Comisaria del Putumayo, Rio Ruyaco, above the confluence with Rio Mocoa.
4. Very rare.
5. Primary forest, alt. 800 m.
6. August 9, 1964.

1290 Sapium sp. (Euphorbiaceae) (det. D. D. Soejarto)

1. Tree, 15 m. tall, ϕ 12 cm. Flowers yellow-green.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Pfo. Asis, Rio Putumayo, El Horizonte.
4. Rare, scattered.
5. Primary forest, alt. 250 m.
6. August 11, 1964.

- 1291 Annona sp. (Annonaceae) (det. D. D. Soejarto)
1. Treelet, 10 m. tall, fruits green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare, scattered.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
- 1292 Flacourtiaceae
1. Tree, 15 m. tall, ϕ 10 cm., fruits gray-green.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare, scattered.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
- 1293 Scheffera aff. acuminata (Araliaceae) (det. D. D. Soejarto)
1. Climber, flowers purple, fruits creamy white, translucent.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Scattered.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
- 1294 Theobroma sp. (Sterculiaceae) (det. D. D. Soejarto)
1. Tree, 25 m. tall, ϕ 20 cm. Bark fibrous. Flowers green.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Very rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
- 1295 ? Miconia sp. (Flacourtiaceae) (det. R. Jaramillo)
1. Treelet, 12 m. tall. Flower buds dark dull-blue.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
- 1296 Melastomaceae
1. Tree, 15 m. tall, ϕ 15 cm. Flower-buds pale green.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
- 1298 Acalypha sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Treelet, 8 m. tall. Inflorescences green, styles white, petals pale green.
2. Stem, leaves, flowers.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Frequent.
5. Primary forest, alt. 250 m.
6. August 14, 1964.

1299 Leonia aff. glycocarpa (Violaceae) (det. D. Soejarto)

1. Tree, 17 m. tall, cauliflorous. Fruits green, inside orange yellow.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Extremely rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.

1300 Duroia aff. hirsuta (Rubiaceae) (det. D. D. Soejarto)

1. Tree, 11 m. tall, ϕ 8 cm. Indument gray to tawny, fruits green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rather common.
5. Primary forest, alt. 250 m.
6. August 14, 1964.

1301

1. Tree, 13 m. tall. Flowers pale green to almost white at the tips of petals, green at base.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.

1302 Sapindaceae

1. Tree, 25 m. tall, 20 cm. ϕ . Fruits turning yellow when ripe, sweet.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.
7. Fruits edible, bats regularly visit the tree.

1303 Leguminosae

1. Tree, 15 m. tall, ϕ 10 cm. Sepals green, petals pale green, stamens white to yellowish-white, rather showy.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, 250 m.
6. August 14, 1964.

1304 ? Clusia (Clusiaceae)

1. Tree, 20 m. tall, ϕ 15 cm. Fruits green, turning reddish or red when ripe, bitter with a slight trace of sweet taste. Latex pale yellow.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rather rare.
5. Primary forest, alt. 250 m.
6. August 14, 1964.

1305 Leguminosae

1. Treelet, 8 m. tall. Sepals green, petals pale pink to white, stamens deep violet.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rather frequent.
5. Primary forest, alt. 250 m.
6. August 14, 1964

1306 Guarea sp. (Meliaceae-) (det. D. D. Soejarto)

1. Tree, 10 m. tall, ϕ 7 cm. Fruits reddish brown, seed pulp bright deep orange.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Extremely rare.
5. Primary forest, 250 m. alt.
6. August 14, 1964.

1307

1. Tree, 15 m. tall, ϕ 10 cm. Fruits brown.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Extremely rare.
5. Primary forest, 250 m. alt.
6. August 14, 1964

1308 Glossoparymum sp. (Violaceae) (det. D. D. Soejarto)

1. Treelet, 10 m. tall. Fruits dark green.
2. Stem, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Very rare.
5. Primary forest, 250 m. alt.
6. August 14, 1964.

1309 Piper sp. (Piperaceae) (det. D. D. Soejarto)

1. Treelet, 10 m. tall, ϕ 5 cm. Inflorescences green, fruits green.
2. Stem, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Frequent.
5. Primary forest, alt. 250 m.
6. August 14, 1964

1310 Palmae

1. Tree, 25 m. tall, 20 cm. ϕ . Fruits black when ripe.
2. Wood, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Very common.
5. Primary forest, alt. 250 m.
6. August 14, 1964.

1312 Euphorbia sp. (Euphorbiaceae) (det. D. D. Soejarto)

1. Very small herb, latex creamy.
2. All parts of the plant.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Very common.
5. Yard and garden clearings, alt. 250 m.
6. August 14, 1964.
7. Said that the plant is boiled, infusion given to cows to make them give more milk.

1313 Leonia sp. (Violaceae) (det. D. D. Soejarto)

1. Tree, 9 m. tall, fruits green.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Very rare.
5. Primary forest, alt. 250 m.
6. August 15, 1964.

1314 Clusia sp. (Clusiaceae) (det. D. D. Soejarto)

1. Tree, 20 m. tall, Ø 25 cm. Flowers dark red, deep yellow latex.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 15, 1964.

1315

1. Tree, 30 m. tall, Ø 35 cm. Fruits pale green-yellow.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 15, 1964.

1316 Leonia aff. glycyarpa (Violaceae) (det. D. D. Soejarto)

1. Tree, 20 m. tall, Ø 25 cm. Fruits green, flowers pale green.
2. Wood, bark, leaves, fruits.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Very rare.
5. Primary forest, alt. 250 m.
6. August 15, 1964.

1317 Annonaceae

1. Tree, 15 m. tall. Flowers brown-yellow, fruits green.
2. Wood, bark, leaves.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rare.
5. Primary forest, alt. 250 m.
6. August 15, 1964.

1318 Nyctandra sp. (Lauraceae) (det. D. D. Soejarto)

1. Tree, 30 m. tall, Ø 35 cm. Flower buds green, flowers dark yellow.
2. Wood, bark, leaves, flowers.
3. Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte.
4. Rather frequent.
5. Primary forest, alt. 250 m.
6. August 15, 1964.

1319

- Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)

1320 Nyctandra sp. (Lauraceae) (det. D. D. Soejarto)

- Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)

- 1321 Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1322 Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1323 Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1324 Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1325 Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1326 Heisteria cf. cyanocarpa (Clacaceae) (det. D. D. Soejarto)
Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1327 Myristicaceae
Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1328 Smilax sp. (Liliaceae) (det. D. D. Soejarto)
Data missing.
(Comisaria del Putumayo, Pto. Asis, Rio Putumayo, El Horizonte)
- 1329 Gesneriaceae
Data missing.
(Dpto. de Nariño, Pasto, El Galeras)
- 1329A Espaletia sp. (Compositae) (det. D. D. Soejarto)
1. Suffrutescent herb, 0.5-2.0 m. tall, stem consisting of clasping leaf bases. Ray and disc flowers bright yellow.
2. All parts of the plant.
3. Dpto. de Nariño, Pasto, El Galeras.
4. Very abundant.
5. High subalpine vegetation, alt. ca. 3500 m.
6. August 22, 1964.
- 1330 Arcytoohyllum sp. (det. D. D. Soejarto)
1. Erect shrub, 0.3 - 0.6 m. tall. Flowers deep violet.
2. Stem, leaves, flowers.
3. Dpto. de Nariño, Pasto, El Galeras.
4. Very common.
5. High subalpine vegetation, alt. ca. 3500 m.
6. August 22, 1964.

1332 Siphocamphyllus sp. (Campanulaceae) (det. D. D. Soejarto)

1. Erect, non-branching, coarse herb, 1-1.8 m. tall, with milky juice. Corolla cream-colored, with a purplish blotch on the upper surface near base.
2. Stem, leaves, flowers.
3. Dpto. de Narifio, Pasto, El Galeras.
4. Common, in groups.
5. High subalpine vegetation, ca. 3200 m. alt.
6. August 22, 1964.

PART III

ECUADOR

Collector: D. D. Soejarto & E. Hernandez

- 1237 Cactaceae
1. Shrub, up to 1 1/2 m. tall, flower buds red.
2. Stem.
3. Prov. de Cotopaxi, Latacunga, roadside between Latacunga and Ambato.
4. Common.
5. Semi desert area, ca. 2500 m. alt.
6. September 1, 1964.
- 1938 Argemone cf. mexicana (Papaveraceae) (det. D. D. Soejarto)
1. Small shrub, leaves gray, flowers yellow, fruits green, abundant yellow latex.
2. All parts of the plant.
3. Prov. Tungurahua, outside Ambato, roadside \pm 5 km. in the direction of Baños.
4. Common.
5. Mixed pasture and abandoned agricultural grounds, alt. ca. 2700 m.
6. September 2, 1964.
- 1339 Verbena cf. microphylla (Verbenaceae) (det. D. D. Soejarto)
1. Small woody herb, spreading habit or in cluster. Sepals green with dark purple tinge, petals white.
2. All parts of the plant.
3. Prov. Tungurahua, roadside, \pm km. outside Ambato in the direction of Baños.
4. Common.
5. Mixed pasture and abandoned agricultural grounds, alt. ca. 2700 m.
6. September 2, 1964.
- 1340 Senecio sp. (Compositae) (det. D. D. Soejarto)
1. Small, spreading herb, flowers yellow.
2. All parts of the plant.
3. Prov. Tungurahua, roadside, \pm 5 km. outside Ambato in the direction of Baños.
4. Common.
5. Mixed pasture and abandoned agricultural grounds, alt. ca. 2700 m.
6. September 2, 1964.

- 1352 ?Chenopodiaceae
1. Very small herb, forming detached-, boulder-like clumps.
2. All parts of the plant.
3. Prov. Chimborazo, Urbina, Páramo de Chimborazo.
4. Abundant.
5. Subalpine vegetation, alt. 3700 m.
6. September 3, 1964.
- 1354 Graminae
1. Small herb, forming dense clusters, inflorescences dark olive.
2. All parts of the plant.
3. Prov. Chimborazo, Urbina, Páramo de Chimborazo.
4. Abundant.
5. Subalpine vegetation, alt. 3700 m.
6. September 3, 1964.
- 1355 Hypochaeris sp. (Compositae) (det. D. D. Soejarto)
1. Small, tufted, flat herb. Flowers rather conspicuous, with green sepals, yellow disc flowers, and white to pink ray flowers.
2. All parts of the plant.
3. Prov. Chimborazo, Urbina, Páramo de Chimborazo.
4. Abundant.
5. Subalpine vegetation, alt. 3700 m.
6. September 3, 1964.
7. "Chicoria."
- 1356 Pyrethrum sp. (Compositae) (det. D. D. Soejarto)
1. Woody herb, 1 m. tall, ray flowers white, disc flowers yellow.
2. All parts of the plant.
3. Prov. de Chimborazo, Urbina, Páramo de Chimborazo.
4. Abundant.
5. Cultivated in large scale, subalpine region, alt. ca. 3700 m.
6. September 3, 1964.
7. Said to be used for DDT.
- 1360 Barnadesia jussieu (Compositae) (det. D. D. Soejarto)
1. Shrub, 1/2 m. tall, inflorescences dark orange.
2. All parts of the plant.
3. Prov. de Chimborazo, Páramo de Chimborazo, at the foot of Nevado de Chimborazo.
4. Very common.
5. Subalpine vegetation, alt. ca. 4200 m.
6. September 3, 1964.
7. "Chukuragua," said to be medicinal.
- 1362 Calceolaria sp. (Scrophulariaceae) (det. D. D. Soejarto)
1. Shrub, 1 m. tall, flowers sulphur yellow.
2. Stem, leaves, flowers.
3. Prov. de Chimborazo, Páramo de Chimborazo, at the foot of Nevado de Chimborazo.
4. Very common.
5. Subalpine vegetation, alt. ca. 4200 m.
6. September 3, 1964.

- 1363 Lupinus sp. (Leguminosae) (det. D. D. Soejarto)
1. Small dense herb. Leaves silvery gray. Flowers deep violet.
2. Stem, leaves, flowers.
3. Prov. de Chimborazo, Páramo de Chimborazo, at the foot of Nevado de Chimborazo.
4. Very common.
5. Subalpine vegetation, alt. ca. 4200 m.
6. September 3, 1964.
- 1376 Solanum sp. (Solanaceae) (det. D. D. Soejarto)
1. Shrub, 2 m. tall. Indument stiff, irritating to skin, glossy. Sepals green, petals bright deep red.
2. Stem, leaves, flowers.
3. Prov. de Chimborazo, Páramo de Chimborazo, at the foot of Nevado de Chimborazo.
4. Very rare.
5. Subalpine vegetation, alt. ca. 4200 m.
6. September 3, 1964.
- 1385 Compositae
1. Dense, spreading woody herb, leaves silvery gray, inflorescences dull pale yellow.
2. Stem, leaves, flowers.
3. Prov. de Chimborazo, Páramo de Chimborazo, at the foot of Nevado de Chimborazo.
4. Very common.
5. Subalpine vegetation, alt. ca. 4200 m.
- 1388 Croton sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Spreading shrub, 1/2 m. tall, lower surface of leaves gray. Fruits gray-brown, perianth gray-brown, stamens pale brown.
2. Stem, leaves, flowers.
3. Prov. de Pichincha, San Antonio, vicinity of the Equator monument.
4. Very common.
5. Semi-desert country, alt. ca. 2800 m.
6. September 4, 1964.
- 1389
1. Small dense herb. Indument stiff, irritating to the skin, silvery gray. Sepals green, petals deep yellow.
2. All parts of the plant.
3. Prov. de Pichincha, San Antonio, vicinity of the Equator monument.
4. Very common.
5. Semi-desert country, alt. ca. 2800 m.
6. September 4, 1964.
- 1390 Euphorbia sp. (Euphorbiaceae) (det. D. D. Soejarto)
1. Small, very spreading, flat herb. Latex creamy, sticky. Fruits dark purplish-red.
2. All parts of the plant.
3. Prov. de Pichincha, San Antonio, vicinity of the Equator monument.
4. Very common.
5. Semi-desert country, alt. ca. 2800 m.
6. September 4, 1964.
7. Said to be medicinal.

1391 Althernanthera sp. (Amaranthaceae) (det. D. D. Soejarto)

1. Spreading shrub, indument faint gray. Inflorescences pale violet to pink.
2. All parts of the plant.
3. Prov. de Pichincha, San Antonio, vicinity of the Equator monument.
4. Very common, in groups.
5. Semi-desert country.
6. September 4, 1964.

1399

1400

1401

1402

1404

1405

These five samples were brought from market in Pasto, Capital of Dpto. de Nariño, Colombia. No. 1405 was labelled s/n: Guayavilla in the burlap bag of sample. In addition, all these five plants are sold for their medicinal properties. Unfortunately, identification is not yet possible.